Info-Hams Digest   Mon, 2 Aug 93   Volume 93 : Issue 937

Today's Topics:
                2M/70cm Activity in the Virgin Islands?
                        Alinco 580 questions
                          Alinco DJ-F1T
              ARRL Space Bulletin 046, MODE B FOR PHASE 3D
                    Earphone Phasing - an experiment
                    FCC class A and B certification
                        Handhelds on airplanes
                How many people actually use paddles ?
            Needed: Source for battry for Zenith Minisport
                          New 97.113 Text
                  Opinions wanted: DJ-580 vs. FT-530
                  Packet on Mac: Need starting advice
                             Perseids
                          posting (2 msgs)

We trust that readers are intelligent enough to realize that all text
herein consists of personal comments and does not represent the official
policies or positions of any party. Your mileage may vary. So there.

I'm leaving in a little over a week for the U.S. Virgin Islands.
Naturally, the allure in signing /KP2 is pretty strong, but as
it is, I own no HF gear. Is it worth it to bring my 2M/70cm HT?

Anyone know whether there's any VHF/UHF down there, either on
St. John or St. Thomas, or even on one of the BVI islands? Maybe
even a repeater (or is that hoping too much?)...

Please reply directly, not to the group.

Thanks!

73 - Alex

Normal disclaimers apply. | Alex Rudd - KA2ZOO
 ___ | John Jay College of Criminal Justice
/   \   / | ----- | City University of New York
|---| / | | | (212) 875-6274
| | / |___ |. 24 Pct. | AHRJJ@CUNYVM.cuny.edu

Date: 3 Aug 1993 04:30:01 GMT
From: usc!math.ohio-state.edu!magnus.acs.ohio-state.edu!flinxwei@network.ucsd.edu
Subject: Alinco 580 questions
To: info-hams@ucsd.edu

Would someone who owns a 580 kindly answer the following questions:

     -what is the RX range(s) after complete modification

     -what is the TX range(s) after complete modification

     -if you were to purchase another dual band HT tomorrow,
      would it be a 580? If not, what would it be?

Thanks for your help. I have a F1T right now, and am considering a 580 or an
Icom W2A. Considering I am the new president of a ham club with a 70cm
repeater, I had best be getting a 440 rig!

73,
Eric

Eric Linxweiler, N8UNN   President, W8LT
The Ohio State Univeristy   The OSU-Amateur Radio Club
                                                 W8ZR/R 442.6+

internet: linxweiler.1@osu.edu

```
packet:        n8unn@w8cqk.#cmh.oh.usa.na
TCP/IP:        44.70.0.108
voice:         614/297-8042
```

Date: 3 Aug 1993 08:27:53 +1000
From: munnari.oz.au!metro!sequoia!ultima!kralizec.zeta.org.au!
kralizec.zeta.org.au!not-for-mail@network.ucsd.edu
Subject: Alinco DJ-F1T
To: info-hams@ucsd.edu

In <9306287438.AA743889224@sceng.UB.com> Gary_Thorburn_at_Notes-Gate@sceng.UB.COM
writes:

> I have the DJ-F1T.   The guy at the Alinco booth at a Hamfest dropped one
> onto a (carpeted) concrete floor in the convention hall and then used it
> to demonstrate its ruggedness. It's the most rugged piece of consumer
> electronics I've ever owned, but then again, I've never bought a tank.
> It's my first HT, so I can't offer any comparisons, but I'm glad I bought
> it.

When we had out local amateur radio field day at Wyong (NSW Central
Coast, about half way between Sydney and Newcastle), I checked out the
DJ-F1T. I currently have a DJ-X1 scanner, which is built into the same
case as the DJ-F1T, and all I can say is to echo your comments about
it's ruggedness.

As I don't yet have an Australian amateur license, I can't own a
transceiver, but I have the DJ-F1T in my sights!

> I don't have the high-power version, but be aware that this is just a
> battery difference. If you buy the low-power version, then purchase the
> high-power battery pack, it becomes a high-power unit.

The thing I like is that you can put an empty dry cell case on the back,
and put a different battery pack somewhere else on your belt, or in the
pocket. When I took my DJ-X1 to Melbourne last year for a steam train
festival (Melbourne is about 1000 km south from Sydney), I travelled
by train, and used a little power pack I had built up to plug into the
240 volt mains outlet on in the sleeping compartment I was in to run
the radio until the next day. It saved me heaps on batteries, sinec I
didn't have a Nicad charger then.
--
Craig Dewick, Trainee Engineman, DELEC, NSW (craig@kralizec.zeta.org.au).
Let not the sands of time abrade your disks, for in time they will become sand.
May you all survive Kralizec, for it will bring about the rebirth of mankind as
a self-perpetuating organism. - Kralizec, the Typhoon Struggle.

Date: Tue, 3 Aug 1993 04:07:51 GMT
From: news.cerf.net!pagesat!spssig.spss.com!feenix.metronet.com!
marcbg@network.ucsd.edu
Subject: ARRL Space Bulletin 046, MODE B FOR PHASE 3D
To: info-hams@ucsd.edu

SB SPACE @ ARL $ARLS046
ARLS046 MODE B FOR PHASE 3D

ZCZC AS26
QST de W1AW
Space Bulletin 046 ARLS046

Date: Tue, 3 Aug 1993 03:54:10 GMT
From: nih-csl!helix.nih.gov!arm@uunet.uu.net
Subject: Earphone Phasing - an experiment
To: info-hams@ucsd.edu

In article <23k31gINN815@newsstand.cit.cornell.edu> F. Kevin Feeney
<fkf1@cornell.edu> writes:
>In article <1993Aug2.194444.14128@alw.nih.gov> Andrew Mitz,
>arm@helix.nih.gov writes:
>>Picking a signal out of the noise (QRN and QRM) is a complex process
>>called auditory scene analysis. It requires more than localization.
>>It would be interesting to build a circuit that makes different cw
>>signals (or voice signals) sound like they come from different locations
>>in space. It would make picking out the signal a lot easier, I suspect.
>>Just a thought, I have no (good) idea how to do it!
>>
>>
>
>A discussion just started up in rec.radio.amateur.homebrew on building a
>system described a number of years back that used a low pass filter to
>the left ear and high pass filter to the right, giving you 'spatial'
>differentiation of signals at different tones. The original author
>claimed that it made picking one cw signal out of a group in the filter
>passband much easier since they appeared to come from different
>locations. From your posting, sounds like that might well be true.
>
>Someday I'll get time to build one of those...
>
>73 de Kevin, WB2EMS (fkf1@cornell.edu)

A great application for digital filtering, but I was thinking that
just frequency filtering is not the only answer. (I'm not sure
what is the better answer.)

--

Andrew Mitz, Biomedical Eng., Nationl Institutes | Opinions are mine alone
of Health Animal Center, Poolesville, MD | arm@helix.nih.gov

Michael Covington (mcovingt@aisun3.ai.uga.edu) wrote:
: In article <23c0fs$s6j@hub.ucsb.edu> upsetter@mcl.ucsb.edu (Jason Hillyard)
writes:
: >I'm working with some people who have developed a computer peripheral
: >and are selling it as a kit. They were thinking of getting it FCC
: >certified.
: >
: >Some questions:
: >
: >- How do you get a product class A or B certified? How much does it cost?
: >- Do kits need to be certified to be legally sold?
: >- Can I get any info from the FCC about this stuff?

: Your college library should have the Code of Federal Regulations in their
: government documents section. Look at Title 47, Part 15.

: :- Michael A. Covington, Associate Research Scientist   :   *****

    I'm interested in one of the topics the original poster asked
    about, ie whether kits need certification. So I went to the
    campus library and read up on the CFR Title 47, Part 15 of
    10 Oct 92. Although the section does in fact speak to the issue of
    compliance by kits, the actual paragraph that treats the subject,
    15.25, pretty narrowly defines "kits" to be only "TV interface devices"
    (aka RF modulators). In section 15.3p a kit is defined as a full or
    partial complement of parts with instructions that when assembled
    would be subject to part 15. If one takes part 15 in literal
    translation, one would have to seek certification for an RF modulator
    kit (or cable TV interface unit kit), or anything else that attaches
    to a consumer television set. Whether a computer interface peripheral

board kit (with external connections outside the computer) needs
certification is not spoken to in part 15, as far as I can tell.

The section on homegrown equipment is very generous, ie they
specifically recognize that people may not necessarily have the
equipment to verify compliance, and require only "good engineering
practice". IMO, they should have left the issue of kits under
the homebuilt devices paragraph (15.23) and left compliance to
the kit builder.

BTW, I would like to hear from anyone who has assembled a kit recently
which included anything along the lines of an FCC compliance statement.

The net is a bad place to get legal advice, so don't base any decisions
on the need for certification solely on this posting!

                    Rick Spanbauer
                    rick@cs.sunysb.edu
                    SUNY/Stony Brook

Date: Tue, 03 Aug 1993 02:23:15 GMT
From: sdd.hp.com!swrinde!cs.utexas.edu!math.ohio-state.edu!magnus.acs.ohio-
state.edu!usenet.ins.cwru.edu!neoucom.edu!wtm@network.ucsd.edu
Subject: Handhelds on airplanes
To: info-hams@ucsd.edu

I haven't taken my hand-held radio on a plane yet, but I have
carried it into the Hopkins airport in Cleveland, Ohio several
times. The reaction has been totally nonchalant to almost a third
degree cross examination. I also have a motorola pocket pager; the
pager hasn't raised any suspicion yet. I've always voluntarily put
my HT and pager on the X-ray machine. The time I was questioned
vigorously on my HT, it seemed to be such that the guards wanted to
sure my HT was not a cellular phone. One time, the guard started
asking questions about my HT, so I thought I was going to be in for
a rough time. It turned out that she (the guard) had seen several
other HTs and wondered what they were; it wasn't too busy so I had
a chance to give a brief explanation of amateur radio.

The net result is that it depends upon the moods of the security
guards, customs agents, flight attendants, pilot, etc. etc. whether
or not you'll be able to take your HT in your carry-on luggage.

--
Bill Mayhew   NEOUCOM Computer Services Department

Rootstown, OH 44272-9995 USA   phone: 216-325-2511
wtm@uhura.neoucom.edu   amateur radio 146.58: N8WED

Date: 3 Aug 93 00:37:37
From: zip.eecs.umich.edu!zip.eecs.umich.edu!hideg@yale.arpa
Subject: How many people actually use paddles ?
To: info-hams@ucsd.edu

Regarding the weights -vs- length discussion:

My understanding of physics is that additional weight does not affect the
perioud of a pendulum. Pendulum *LENGTH* changes the period.

--Steve
  N8HSC, just learning to use a bug.

Date: 28 Jul 93 15:23:53 GMT
From: dog.ee.lbl.gov!overload.lbl.gov!agate!spool.mu.edu!olivea!isc-br!tau-ceti!
comtch!opus-ovh!bmork@network.ucsd.edu
Subject: Needed: Source for battry for Zenith Minisport
To: info-hams@ucsd.edu

amy@alchemy.TN.Cornell.EDU (Amy Rechenmacher) writes:

> Help, the battery in my Zenith Minisport HD just died and I need a new one
> ASAP. Does anybody have a source for them? Please drop me a reply via
> email. Many thanks..

The best source of collective information for the Minisport is the
MiniSport Laptop Hacker series distributed in the comp.sys.zenith and
rec.radio.amateur.packet newsgroups. ..I'm not biased :)

Have you tried directly connecting to the wall power and see that it
works fine? Many power supplies are failing (which would show up
in both cases), but you have the first dead battery I've heard of.

Brian Mork   Internet bmork@opus-ovh.spk.wa.us
 . . . .   Amateur Radio ka9snf@wb7nnf.#spokn.wa.usa
.. . ..   USMail 6006-B Eaker, Fairchild, WA 99011

Date: Tue, 3 Aug 1993 04:04:59 GMT

The following is the 1993 change to FCC rule 97.113

    97.113 Prohibited transmissions.

    (a) No amateur station shall transmit:

    (1) Communications specifically prohibited elsewhere in this Part:

    (2) Communications for hire or for material compensation, direct or
indirect, paid or promised, except as otherwise provided in these rules;

    (3) Communications in which the station licensee or control
operator has a pecuniary interest, including communications on behalf
of an employer. Amateur operators may, however, notify other amateur
operators of the availability for sale or trade, of apparatus normally
used in an amateur station, provided that such activity is not conducted
on a regular basis;

    (4) Music using a phone emission except as specifically provided
elsewhere in this Section; Communications intended to facilitate a
criminal act; Messages in codes or ciphers intended to obscure the meaning
thereof, except as otherwise provided herein; Obscene or indecent words
or language; or false or deceptive messages, signals, or identification;

    (5) Communications, on a regular basis, which could reasonably be
furnished alternatively through other radio services.

    (b) An amateur station shall not engage in any form of
broadcasting, nor may an amateur station transmit one-way communications
except as specifically provided in these rules; nor shall an amateur
station engage in any activity related to program production or
newsgathering for broadcasting purposes, except that communications
directly related to the immediate safety of human life or the protection
of property may be provided by amateur stations to broadcasters for
dissemination to the public where no other means of communication is
reasonably available before or at the time of the event.
    (c) A control operator may accept compensation as an incident of a
teaching position during periods of time when an amateur station is used
by that teacher as a part of classroom instruction at an educational
institution.
    (d) A control operator of a club station may accept compensation
for the periods of time when the station is transmitting telegraphy

practice or information bulletins, provided that the station transmits
such telegraphy practice and bulletins for at least 40 hours per week;
schedules operations on at least six amateur service MF and HF bands
using reasonable measures to maximize coverage; where the schedule of
normal operating times and frequencies is published at least 30 days in
advance of the actual transmissions; and where the control operator
does not accept any direct or indirect compensation for any other
service as a control operator.
       (e) No station shall retransmit programs or signals emanating from
any type of radio station other than an amateur station, except
propagation and weather forecast information intended for use
by the general public and originated from United States Government
stations,
and communications, including incidental music, originating on United
States Government frequencies between a space shuttle and its associated
Earth stations. Prior approval for shuttle retransmissions must be
obtained from the National Aeronautics and Space Administration. Such
retransmissions must be for the exclusive use of amateur operators.
Propagation, weather forecasts, and shuttle retransmissions may not be
conducted on a regular basis, but only occasionally, as an incident of
normal amateur radio communications.
       (f) No amateur station, except an auxiliary, repeater or space
station, may automatically retransmit the radio signals of other
amateur stations.
--
Marc B. Grant, N5MEI | marcbg@feenix.metronet.com | 214/231-3998 (voice)
P.O Box 850472 | marcbg@esy.com | 214/231-0025 (fax)
Richardson, TX 75085 | |

Date: Tue, 03 Aug 1993 02:41:12 GMT
From: usc!math.ohio-state.edu!magnus.acs.ohio-state.edu!usenet.ins.cwru.edu!
neoucom.edu!wtm@network.ucsd.edu
Subject: Opinions wanted: DJ-580 vs. FT-530
To: info-hams@ucsd.edu

Speaking of the voltmeter on the Yaesu 530...

Something I'd like to see on an HT is an mAH meter. It doesn't
seem like it would be too difficult for an HT's microprocessor to
integrate the current flow from the battery. The terminal voltage
on ni-cd batteries doesn't drop very much until they're about
spent. Integrating the current consumption might give a little
more useful indication of the amount of charge left in the battery.

The idea of integrating current consumption has been done after a
fashion with a TSR program for portable DOS computers. The program

called Battery Watch keeps track of how long the various subsystems
of the portable have been running: HDU, floppy, etc. The times are
multiplied by the estimate of the subsystems' draw then totalized.
The same procedure could be used by the HT's microprocessor since
the approximate current draw for the various subsystems is known,
the micro doesn't need to measure current flow directly.

Another thing that would be nice to have would be some sort of
audio anunciatior that would chirp if the battery voltage drops too
low to power the radio while the the unit is keyed in transmit
state. It is rather aggrivating to discover taht I've been talking
into a dead HT for the last minute or so

Heaven only knows if these ideas are patented. If they aren't, I
said it first! :-).

--
Bill Mayhew   NEOUCOM Computer Services Department
Rootstown, OH 44272-9995 USA   phone: 216-325-2511
wtm@uhura.neoucom.edu   amateur radio 146.58: N8WED

Date: 3 Aug 93 06:11:21 GMT
From: news-mail-gateway@ucsd.edu
Subject: Packet on Mac: Need starting advice
To: info-hams@ucsd.edu

Greetings, Hams!

I'm looking for advice on how to get started with Packet, using my Macintosh.
Any advice on low cost TNC's, software?

Anybody want to offload their old Mac Packet setup to get me started?

Also... I heard that somewhere on the Internet there is a repository of
Macintosh software relating to Ham Radio. Will someone please give me a
clue as to its whereabouts?

Gratefully,

\\\\\\\\\//////////
\ Jeff Phillips   /
\ KD6ONM   /
/ phillips@   \
/ nexus.chapman.edu\
//////////\\\\\\\\\\

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Date: 3 Aug 93 02:11:11 GMT
From: news-mail-gateway@ucsd.edu
Subject: Perseids
To: info-hams@ucsd.edu

Perseids
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Active: July 17--August 24
Maxima: August 12, 4h UT (lambda=139.6deg) and 15h UT (lambda=140.1)
ZHR = 95
Radiant : alpha=46deg, delta=+58deg
Delta\alpha, Delta\delta: see Table 4
diameter: 5deg
V = 59 km/s
r= 2.6
TFC: alpha=019deg, delta=+38deg and alpha=348deg, delta=+74deg
     before 2h local time
     alpha=043deg, delta=+38deg and alpha=073deg, delta=+66deg
     after 2h local time (beta >20deg N)

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Date: Tue, 3 Aug 1993 00:37:31 GMT
From: pipex!bnr.co.uk!bnrgate!bcars267!bnr.ca!wdhyte@uunet.uu.net
Subject: posting
To: info-hams@ucsd.edu

well, I got an email answer that helped me quite a bit. Basically it
is consideredd bad nettiquete (sp) to post binary files into NON
binary newgroups. Makes perfect sense to me. Now, do we (hams) *have*
a binary posting newsgroup (rec.radio.amateur.binary?) that we CAN
put stuff of a share/freeware nature? One doesn't appear on my
server but that doesn't mean it's not out there. I ask this
specifically for the untold number of us that have access to the net
but for one reason or another do not have FTP access to the net or
to any of the archive sites (picture of myself holding hand in the
air with sheepish grin). So, do we have one (binary area)? Do we
need one? Anyone with more experience than myself (oldtimer of 6 weeks
now on the net!) have a suggestion or want to volunteer to be a
moderator of a new group (I don't have a clue as to what's involved
in even creating a new group, who to talk to, etc.).

Dave/7J1AIW/WZ1S
```

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-... -. .-.  .--- .- .--. .- -. .. -. - --- -.- -.-- --- .-.-.-  (.)(.)
```
wdhyte@bnr.ca (Dave Hyte) | ESN 624-2826 | Opinions/ideas are my own
Bell-Northern Research Japan| DID 5421-2826 | (unless it sounds stupid, in
Minato-ku, Tokyo, Japan 106 |+-+-+-+-+-+-+| which case I stole it from ya)

Date: Mon, 2 Aug 93 21:44:29 -0800
From: rtech!amdahl!grafex!ka6etb@decwrl.dec.com
Subject: posting
To: info-hams@ucsd.edu

In <1993Aug3.003731.8056@bnr.ca> wdhyte@bnr.ca (David Hyte) writes:
>well, I got an email answer that helped me quite a bit. Basically it
>is consideredd bad nettiquete (sp) to post binary files into NON
>binary newgroups. Makes perfect sense to me. Now, do we (hams) *have*
>a binary posting newsgroup (rec.radio.amateur.binary?) that we CAN
>put stuff of a share/freeware nature? One doesn't appear on my
>server but that doesn't mean it's not out there.

comp.binaries.ibm.pc for dos stuff
comp.binaries.ms-windows for windows stuff
comp.binaries.mac for Macintosh stuff

I ask this
>specifically for the untold number of us that have access to the net
>but for one reason or another do not have FTP access to the net or
>to any of the archive sites (picture of myself holding hand in the
>air with sheepish grin).

I guess my last post dropped into the bit bucket.

Hams without ftp access can request files from my mail server.

Send email to HAM-server@GRAFex.Cupertino.CA.US

In the TEXT, place

HELP
INDEX
QUIT

Please DO NOT reply to this news post for the above files.

So, do we have one (binary area)? Do we
>need one? Anyone with more experience than myself (oldtimer of 6 weeks
>now on the net!) have a suggestion or want to volunteer to be a
>moderator of a new group (I don't have a clue as to what's involved

>in even creating a new group, who to talk to, etc.).

Best advice I ever heard. Subscribe to news.groups and read it diligently
for six months. Then...read it for another year. Starting news groups
is not for the faint at heart, nor thin skinned.

73 de KA6ETB

Date: (null)
From: (null)

Date: (null)
From: (null)
--
Marc B. Grant, N5MEI | marcbg@feenix.metronet.com | 214/231-3998 (voice)
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End of Info-Hams Digest V93 #937
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